

# **Encyclopedia of Armenian Science and Technology**

By  
**Edic Baghdasarian**  
(Ed. Germanic)

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**Հայկական Ուսումնասիրությունների Կենտրոն**  
**Armenian Research Center**  
**Toronto, Canada**

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**Հայկ. Գիտությունների ու Տեխնոլոգիայի Համառոտ Հանրագիտարան, Անգլերեն**  
**Տորոնտո, Կանադա**

## Abbreviations

|      |                                                                      |
|------|----------------------------------------------------------------------|
| AD   | Anno Domini (in the year of the Lord), After Christ, CE (Common Era) |
| ASSR | Armenian Soviet Socialist Republic                                   |
| BC   | Before Christ                                                        |
| C.   | Century                                                              |
| CC   | Centuries                                                            |
| EA   | Eastern Armenia                                                      |
| GA   | Greater Armenia                                                      |
| LA   | Lesser Armenia                                                       |
| RA   | Republic of Armenia                                                  |
| WA   | Western Armenia                                                      |
| WWI  | First World War                                                      |
| WWII | Second World War                                                     |
| ANAS | Armenian National Academy of Sciences                                |
| YSU  | Yerevan State University (YSU)                                       |
| SU   | Soviet Union                                                         |
| SEUA | State Engineering University of Armenia                              |

## Armenian Alphabets

|       |        |                                             |      |     |      |
|-------|--------|---------------------------------------------|------|-----|------|
| Աւ    | Aa     | as in Part                                  | Փփ   | Pp  | Put  |
| Բբ    | Bb     | Boy                                         | Զզ   | Kk  | Kit  |
| Գգ    | Gg     | Good                                        | Ել Լ | Yev |      |
| Դդ    | Dd     | Door                                        | Օօ   | Oo  | Or   |
| Եե    | Yy, Ee | Yard, pet                                   | Ֆֆ   | Ff  | Foot |
| Զզ    | Zz     | Zoo                                         |      |     |      |
| Էե    | Ee     | Egg                                         |      |     |      |
| Ըը    | e'     | as in Turn                                  |      |     |      |
| Թթ    | Tt     | To                                          |      |     |      |
| Ժժ    | Zh     | as in Pleasure                              |      |     |      |
| Իի    | Ii, ea | as in Peak                                  |      |     |      |
| Լլ    | Ll     | Look                                        |      |     |      |
| Խխ    | Kh     | as X in Russian                             |      |     |      |
| Ծծ    | ds     | as in dsar in Armenian meaning Tree         |      |     |      |
| Կկ    | hard k | as in Krak in Armenian meaning Fire         |      |     |      |
| Հհ    | Hh     | House                                       |      |     |      |
| Ձձ    | dz     | as in dzoo in Armenian meaning Egg          |      |     |      |
| Ղղ    | gh     | as in R in French or german                 |      |     |      |
| Ճճ    | tch    | Armenian Tchut meaning chicken              |      |     |      |
| Մմ    | Mm     | Mom                                         |      |     |      |
| Եյ    | Yy     | Yes                                         |      |     |      |
| Նն    | Nn     | No                                          |      |     |      |
| Շշ    | Sh     | Show                                        |      |     |      |
| Ոո    | Vo, Oo | More                                        |      |     |      |
| Չչ    | Ch     | Chair                                       |      |     |      |
| Պպ    | P'     | Hard P as in Piti in Armenian meaning Must  |      |     |      |
| Ջջ    | Jj     | Jerm                                        |      |     |      |
| Ռռ    | RR     | Rock                                        |      |     |      |
| Սս    | Ss     | Sick                                        |      |     |      |
| Վվ    | Vv     | Verb                                        |      |     |      |
| Տտ    | Th     | Hard T as in Thun in Armenian meaning house |      |     |      |
| Րր    | Rr     | Room                                        |      |     |      |
| Յյ    | Ts     | Hertz                                       |      |     |      |
| Ու ու | U in   | Urmia                                       |      |     |      |

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# F

## oreword

In 2016, I defined a new project to publish a set of my Encyclopedias in English which could have a wide audience. These works are results of a few decades of studies, research, collection of resources (personal 100,000 books and thousands of archival documents, access to millions of books in the Armenian, Canadian, American and European national and university libraries, Armenian libraries of Vienna, Venice, New Julfa, Tehran and Tabriz ). The first one was the Armenian Geographical Encyclopedia, published early 2017, then the second one, the Armenian Biographical Encyclopedia published in the Fall of 2017, then third volume under the Armenian Diaspora Encyclopedia was published and now I am presenting the fourth volume which is titled “The Encyclopedia of the Armenian Political History” which is actually the Armenian states Encyclopedia and is based on my other work titled “The History of the Armenian State” in seven volumes, in Armenian language published in Toronto. The series of encyclopedias will continue and will be published in the next few months, the fifth volume will be Armenian Scientific Encyclopedia, and the sixth volume will be “The Armenian printing and publication Encyclopedia” and so on.

Unfortunately Armenian sources in English language are not too many. Fortunately some valuable endeavors have been accomplished in the field of Armenian history in Armenian language since the 5<sup>th</sup> century until now, especially during Soviet era (1920-1990) which is the second Golden Era of the Armenian history after the first one which was the Fifth century. I hate to say that the books published in Armenia after 1991, when Armenia became “independent”, are not reliable in general sense with some exceptions. The reason is that due to collapse of Soviet Union, critical political and economical and cultural situation was created in the Armenian Republic. Many historians started writing books based on special orders. Academy of Sciences, Universities, etc. and the people involved lost greatly their scientific values and responsibilities. Many secret and –non-secret agents came to Armenia from different

countries and put oil on the “corruption fire”. On top of that some individuals also were not exempted from this process. Financial corruption caused degradation in every aspect of lives of the people. And the books published abroad, in general are not reliable in general, there are terrible mistakes in their contents, deliberately or mistakenly. Of course it is not appropriate to present these books and individuals here.

I decided to prepare this book as a brief encyclopedia of the Armenian history from Social, Political and Cultural point of view. Due to limitation of the contents of this book, I have tried to present the articles as brief as possible.

Before presenting the main body of the book I thought it would be appropriate to introduce the brief History of Armenia and the Armenian people, Geography, etc. The main sources for writing this book were my “History of the Armenian State”, several editions of the History of Armenia, Armenian Soviet Encyclopedia (13 volumes), Armenian Concise Encyclopedia (4 volumes), multi-volume historical books of the classic Armenian historians (5-21 centuries), valuable works of Hrachia Atcharian, Encyclopedia of Armenian question, Encyclopedia of Armenian Diaspora, Some Greek and Roman classic sources, Persian and Arabic classic works, contemporary literature, travel notes, Armenian websites about Armenians, National Statistical data of Republic of Armenia, Encyclopedia of Britannica and Americana, multi-volume dictionary (encyclopedia) of Persian language by Dehkhoda in 32 volumes, Persian dictionary of Dr. Moien (volumes 5 & 6) Online Encyclopedias such as Wikipedia, Iranica, many other websites, etc.

In the Appendices section there are some complementary sub-sections, so that the reader can have better and deeper understanding of the historical processes occurred in this country and in the lives of Armenian people.

I’d like to appreciate any comments and suggestions to my potential errors for them I need to apologize, I will do my best to improve the quality of this research for the next printings.

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